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**MISCELLANEOUS PLASTICS PRODUCTS, NOT ELSEWHERE CLASSIFIED**

Industries 3081, 3082, 3083, 3084, 3085, 3086, 3087, 3088, and 3089

**INTRODUCTION**

This report presents preliminary statistics from the 1987 Census of Manufactures for those establishments classified in the industries listed above. These data will be superseded by a more comprehensive final paperbound report. The method of data collection and use of administrative data are discussed in detail in the appendix.

All dollar figures included in this report are at prices current for the year specified and, therefore, unadjusted for changes in price levels. Consequently, when making comparisons to prior years, users should take into consideration the inflation that has occurred.

The definitions of these industries are the same as those used in the 1987 Standard Industrial Classification (SIC) Manual.<sup>1</sup>

**INDUSTRY 3081, UNSUPPORTED PLASTICS  
FILM AND SHEET**

In the 1987 Census of Manufactures, Industry 3081, Unsupported Plastics Film and Sheet, had employment of 47.9 thousand.

The total value of shipments for establishments classified in this industry was \$8.1 billion.

The cost of materials and services used by establishments in this industry amounted to \$4.1 billion in 1987. Data on specific materials consumed appear in table 3.

<sup>1</sup>Standard Industrial Classification Manual: 1987. For sale by Superintendent of Documents, U.S. Government Printing Office, Washington, DC 20402. Stock No. 041-001-00314-2.

Address inquiries to Bureau of the Census, Industry Division, Washington, DC 20233, or call Laurie Perper (301) 763-7304.

**INDUSTRY 3082, UNSUPPORTED PLASTICS  
PROFILE SHAPES**

In the 1987 Census of Manufactures, Industry 3082, Unsupported Plastics Profile Shapes, had employment of 25.0 thousand.

The total value of shipments for establishments classified in this industry was \$2.3 billion.

The cost of materials and services used by establishments in this industry amounted to \$1.1 billion in 1987. Data on specific materials consumed appear in table 3.

**INDUSTRY 3083, LAMINATED PLASTICS PLATE,  
SHEET, AND PROFILE SHAPES**

In the 1987 Census of Manufactures, Industry 3083, Laminated Plastics Plate, Sheet, and Profile Shapes, had employment of 17.2 thousand.

The total value of shipments for establishments classified in this industry was \$2.1 billion.

The cost of materials and services used by establishments in this industry amounted to \$1.0 billion in 1987. Data on specific materials consumed appear in table 3.

**INDUSTRY 3084, PLASTICS PIPE**

In the 1987 Census of Manufactures, Industry 3084, Plastics Pipe, had employment of 12.5 thousand.

The total value of shipments for establishments classified in this industry was \$2.5 billion.

The cost of materials and services used by establishments in this industry amounted to \$1.5 billion in 1987. Data on specific materials consumed appear in table 3.



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## INDUSTRY 3085, PLASTICS BOTTLES

In the 1987 Census of Manufactures, Industry 3085, Plastics Bottles, had employment of 24.8 thousand.

The total value of shipments for establishments classified in this industry was \$2.8 billion.

The cost of materials and services used by establishments in this industry amounted to \$1.4 billion in 1987. Data on specific materials consumed appear in table 3.

## INDUSTRY 3086, PLASTICS FOAM PRODUCTS

In the 1987 Census of Manufactures, Industry 3086, Plastics Foam Products, had employment of 60.0 thousand.

The total value of shipments for establishments classified in this industry was \$6.7 billion.

The cost of materials and services used by establishments in this industry amounted to \$3.7 billion in 1987. Data on specific materials consumed appear in table 3.

## INDUSTRY 3087, CUSTOM COMPOUNDING OF PURCHASED PLASTICS RESINS

In the 1987 Census of Manufactures, Industry 3087, Custom Compounding of Purchased Plastics Resins, had employment of 16.2 thousand.

The total value of shipments for establishments classified in this industry was \$2.3 billion.

The cost of materials and services used by establishments in this industry amounted to \$1.4 billion in 1987. Data on specific materials consumed appear in table 3.

## INDUSTRY 3088, PLASTICS PLUMBING FIXTURES

In the 1987 Census of Manufactures, Industry 3088, Plastics Plumbing Fixtures, had employment of 7.1 thousand.

The total value of shipments for establishments classified in this industry was \$650.7 million.

The cost of materials and services used by establishments in this industry amounted to \$274.5 million in 1987. Data on specific materials consumed appear in table 3.

## INDUSTRY 3089, PLASTICS PRODUCTS, N.E.C.

In the 1987 Census of Manufactures, Industry 3089, Plastics Products, N.E.C., had employment of 379.1 thousand.

The total value of shipments for establishments classified in this industry was \$33.1 billion.

The cost of materials and services used by establishments in this industry amounted to \$15.6 billion in 1987. Data on specific materials consumed appear in table 3.

## ABBREVIATIONS AND SYMBOLS

The following abbreviations and symbols are used in the tables in this publication:

-	Represents zero.
(D)	Withheld to avoid disclosing data for individual companies; data are included in higher level totals.
(NA)	Not available.
(NC)	Not comparable.
(S)	Withheld because estimate did not meet publication standards on the basis of either the response rate or a consistency review.
(X)	Not applicable.
(Z)	Less than half the unit shown.
do	Ditto.
n.e.c.	Not elsewhere classified.
n.s.k.	Not specified by kind.
pt.	Part.
r	Revised.
SIC	Standard Industrial Classification.

Other abbreviations, such as lb, gal, yd, doz, bbl, and s tons, are used in the customary sense.

## CONTACTS FOR DATA USERS

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Census/ASM		
Durables	Kenneth Hansen	(301) 763-7304
Nondurables	Michael Zampogna	(301) 763-2510
Current Industrial Reports		
Durables	Malcolm Bernhardt	(301) 763-2518
Nondurables	Thomas Flood	(301) 763-5911
Import/Export Publications	Foreign Trade Division	(301) 763-5140
Industry Analysis and Forecasts	International Trade Administration	(202) 377-4356



# Table 1. Historical Statistics for the Industry: 1987 and Earlier Years

[Excludes data for auxiliaries. For meaning of abbreviations and symbols, see introductory text. For explanation of terms, see appendix ]

Year <sup>1</sup>	Com-panies <sup>2</sup> (no.)	All establishments <sup>3</sup>		All employees		Production workers			Value added by manufac- ture <sup>4</sup> (million dollars)	Cost of materials (million dollars)	Value of shipments (million dollars)	New capital expend- itures (million dollars)	End-of- year inven- tories <sup>4</sup> (million dollars)	Ratios	
		Total (no.)	With 20 employ- ees or more (no.)	Number (1,000)	Payroll (million dollars)	Number (1,000)	Hours (millions)	Wages (million dollars)						Spe- cial- ization (per- cent)	Cover- age (per- cent)
1987 Census ----	INDUSTRY 3081, UNSUPPORTED PLASTICS FILM AND SHEET <sup>5</sup>														
	(NA)	592	384	47.9	1 242.6	34.8	73.4	780.4	4 007.8	4 083.5	8 059.8	417.1	984.3	(NA)	(NA)
1987 Census ----	INDUSTRY 3082, UNSUPPORTED PLASTICS PROFILE SHAPES <sup>5</sup>														
	(NA)	578	295	25.0	508.8	19.0	37.7	313.7	1 175.2	1 104.7	2 253.2	127.6	297.1	(NA)	(NA)
1987 Census ----	INDUSTRY 3083, LAMINATED PLASTICS PLATE, SHEET, AND PROFILE SHAPES <sup>5</sup>														
	(NA)	232	103	17.2	411.9	12.9	27.6	274.7	1 120.6	1 017.1	2 133.3	53.9	292.9	(NA)	(NA)
1987 Census ----	INDUSTRY 3084, PLASTICS PIPE <sup>5</sup>														
	(NA)	251	177	12.5	263.1	9.5	19.1	174.5	980.7	1 476.7	2 455.8	56.4	304.6	(NA)	(NA)
1987 Census ----	INDUSTRY 3085, PLASTICS BOTTLES <sup>5</sup>														
	(NA)	283	225	24.8	492.5	21.2	43.4	378.1	1 325.0	1 437.4	2 765.5	167.3	244.2	(NA)	(NA)
1987 Census ----	INDUSTRY 3086, PLASTICS FOAM PRODUCTS <sup>5</sup>														
	(NA)	929	574	60.0	1 158.4	46.9	90.1	767.9	2 949.8	3 722.9	6 665.3	321.6	625.1	(NA)	(NA)
1987 Census ----	INDUSTRY 3087, CUSTOM COMPOUNDING OF PURCHASED PLASTICS RESINS <sup>5</sup>														
	(NA)	387	188	16.2	375.0	11.2	23.3	207.8	923.1	1 445.0	2 349.7	88.8	297.2	(NA)	(NA)
1987 Census ----	INDUSTRY 3088, PLASTICS PLUMBING FIXTURES <sup>5</sup>														
	(NA)	168	75	7.1	127.3	5.3	10.1	76.6	382.6	274.5	650.7	11.7	66.6	(NA)	(NA)
1987 Census ----	INDUSTRY 3089, PLASTICS PRODUCTS, N.E.C. <sup>5</sup>														
	(NA)	8 287	3 888	379.1	7 140.4	298.4	588.5	4 689.9	17 592.2	15 641.8	33 060.5	1 315.0	3 725.7	(NA)	(NA)

Note: Establishments of single unit companies with up to 20 employees (cutoff varied by industry) were excluded from the mail portion of the census. Data for these establishments (and a small number of larger establishments whose reports were not received at the time the data were tabulated) were estimated based on administrative-record information from other agencies in conjunction with industry averages. These establishments accounted for the following percent of total value of shipments: SIC 3081, 3%; SIC 3082, 4%; SIC 3083, 2%; SIC 3084, 5%; SIC 3085, 4%; SIC 3086, 5%; SIC 3087, 3%; SIC 3088, 5%; and SIC 3089, 25%.

<sup>1</sup>In annual survey of manufactures (ASM) years, data are estimates based on a representative sample of establishments canvassed annually and may differ from results of a complete canvass of all establishments. ASM publication shows percentage standard errors. Unless otherwise noted, for data prior to 1972, see 1972 Census of Manufactures, vol. II, table 1a of the Industry chapter.

<sup>2</sup>For the census, a company is defined as a business organization consisting of one establishment or more under common ownership or control.

<sup>3</sup>Includes establishments with payroll at any time during year.

<sup>4</sup>Beginning with the 1982 Census of Manufactures, all respondents were requested to report their inventories at (the lower of) cost or market prior to adjustment to LIFO cost. This is a change from prior Censuses and annual surveys of manufactures in which respondents were permitted to value their inventories using any generally accepted accounting method. Consequently, inventories and value added by manufacture are not comparable to prior-year data.

<sup>5</sup>Industry definition is new for 1987 Census of Manufactures. An explanation of the Standard Industrial Classification revision will appear in the final industry series text that supercedes this report.

# Table 2. Product and Product Classes—Value of Shipments by All Producers: 1987 and 1982

[Includes value of products of this industry produced by (1) establishments classified in this industry (primary) and (2) establishments classified in other industries (secondary). Transfers of products of this industry from one establishment of the same company (interplant transfers) are also included. For further explanation, see Value of Shipments in appendix. For meaning of abbreviations and symbols, see introductory text.]

1987 product code	Product	1987		1982	
		Number of companies with shipments of \$100,000 or more	Value of product shipments <sup>1</sup> (million dollars)	Number of companies with shipments of \$100,000 or more	Value of product shipments <sup>1</sup> (million dollars)
<b>3081- --</b>	<b>UNSUPPORTED PLASTICS FILM AND SHEET</b>				
	<b>Total -----</b>	<b>(NA)</b>	<b>8 667.1</b>	<b>(NA)</b>	<b>6 026.8</b>
30810 --	Plastics film and sheet, unsupported:				
30810 10	Cellulosic -----	(NA)	619.9	(NA)	(NA)
30810 20	Polyethylene -----	(NA)	2 494.1	(NA)	(NA)
30810 30	Polypropylene -----	(NA)	595.1	(NA)	(NA)
30810 40	Vinyl and vinyl copolymer -----	(NA)	1 378.6	(NA)	(NA)
30810 50	Other -----	(NA)	2 970.5	(NA)	(NA)
30810 00	Plastics film and sheet, unsupported, n.s.k., typically for establishments with 20 employees or more (see note) -----	(NA)	548.7	(NA)	(NA)
30810 02	Unsupported plastics film and sheet, n.s.k., typically for establishments with less than 20 employees (see note) -----	(NA)	60.2	(NA)	(NA)

See footnotes at end of table.

Table 2. **Product and Product Classes—Value of Shipments by All Producers: 1987 and 1982**

—Con.

[Includes value of products of this industry produced by (1) establishments classified in this industry (primary) and (2) establishments classified in other industries (secondary). Transfers of products of this industry from one establishment of the same company (interplant transfers) are also included. For further explanation, see Value of Shipments in appendix. For meaning of abbreviations and symbols, see introductory text.]

1987 product code	Product	1987		1982	
		Number of companies with shipments of \$100,000 or more	Value of product shipments <sup>1</sup> (million dollars)	Number of companies with shipments of \$100,000 or more	Value of product shipments <sup>1</sup> (million dollars)
<b>3082- --</b>	<b>UNSUPPORTED PLASTICS PROFILE SHAPES</b>				
	Total .....	(NA)	2 346.7	(NA)	<sup>2</sup> 1 257.9
30820 --	Plastics unsupported rods, shapes, tubes, profiles, and other shapes (excluding foam):				
30820 10	Acrylate and methacrylate .....	(NA)	84.6	(NA)	(NA)
30820 20	Cellulosic .....	(NA)	17.1	(NA)	(NA)
30820 30	Polyamide (nylon) .....	(NA)	104.3	(NA)	(NA)
30820 40	Polyethylene .....	(NA)	365.8	(NA)	(NA)
30820 50	Polypropylene .....	(NA)	271.3	(NA)	(NA)
30820 60	Polystyrene .....	(NA)	242.7	(NA)	(NA)
30820 70	Styrene copolymer .....	(NA)	28.7	(NA)	(NA)
30820 80	Vinyl and vinyl copolymer .....	(NA)	368.3	(NA)	(NA)
30820 00	Other .....	(NA)	709.7	(NA)	(NA)
30820 00	Plastics unsupported rods, shapes, tubes, profiles, and other shapes, excluding foam, n.s.k., typically for establishments with 20 employees or more (see note) .....	(NA)	67.6	(NA)	(NA)
30820 02	Unsupported plastics profile shapes, n.s.k., typically for establishments with less than 20 employees (see note) .....	(NA)	86.6	(NA)	(NA)
<b>3083- --</b>	<b>LAMINATED PLASTICS PLATE, SHEET, AND PROFILE SHAPES</b>				
	Total .....	(NA)	2 083.5	(NA)	<sup>3</sup> 1 854.2
30830 --	Plastics laminates (excluding flexible packaging):				
30830 11	Thermosetting .....	(NA)	794.6	(NA)	(NA)
30830 13	Thermoplastics .....	(NA)	604.8	(NA)	(NA)
30830 19	Other laminates .....	(NA)	594.1	(NA)	(NA)
30830 00	Plastics laminates (excluding flexible packaging), n.s.k., typically for establishments with 20 employees or more (see note) .....	(NA)	53.0	(NA)	(NA)
30830 02	Laminated plastics plate, sheet, and profile shapes, n.s.k., typically for establishments with less than 20 employees (see note) .....	(NA)	37.0	(NA)	(NA)
<b>3084- --</b>	<b>PLASTICS PIPE</b>				
	Total .....	(NA)	2 386.4	(NA)	1 406.7
30840 --	Plastics piping:				
30840 11	Drain, waste, and vent .....	(NA)	544.1	(NA)	387.7
30840 12	Sewer .....	(NA)	383.0	(NA)	182.0
30840 13	Oil and gas .....	(NA)	186.1	(NA)	139.5
30840 14	Water .....	(NA)	785.6	(NA)	355.9
30840 15	Industrial and mining (including chemical processing, food processing) ...	(NA)	126.2	(NA)	151.2
30840 19	Other .....	(NA)	230.8	(NA)	190.4
30840 00	Plastics piping, n.s.k., typically for establishments with 20 employees or more (see note) .....	(NA)	112.4	(NA)	-
30840 02	Plastics pipe, n.s.k., typically for establishments with less than 20 employees (see note) .....	(NA)	18.1	(NA)	(NA)
<b>3085- --</b>	<b>PLASTICS BOTTLES</b>				
	Total .....	(NA)	2 786.1	(NA)	1 921.4
30850 --	Plastics bottles:				
30850 00	Plastics bottles .....	(NA)	2 762.0	(NA)	1 921.4
30850 02	Plastics bottles, n.s.k., typically for establishments with less than 20 employees (see note) .....	(NA)	24.1	(NA)	(NA)
<b>3086- --</b>	<b>PLASTICS FOAM PRODUCTS</b>				
	Total .....	(NA)	6 841.8	(NA)	4 357.9
30861 --	Transportation plastics foam products:				
30861 00	Transportation (including seating, dash, and other interior/exterior components) .....	(NA)	1 043.1	(NA)	826.3
30862 --	Packaging plastics foam products .....	(NA)	1 033.3	(NA)	889.9
30862 10	Protective shipping pads and shaped cushioning (peanuts, disks, etc.) ...	(NA)	328.6	(NA)	889.9
30862 20	Food containers .....	(NA)	469.4	(NA)	889.9
30862 90	Other .....	(NA)	215.3	(NA)	(NA)
30862 00	Packaging plastics foam products, n.s.k. ....	(NA)	-	(NA)	(NA)
30863 --	Building and construction plastics foam products .....	(NA)	854.9	(NA)	516.8
30863 10	Insulation, including pipe and block .....	(NA)	643.7	(NA)	516.8
30863 90	Other .....	(NA)	211.3	(NA)	(NA)
30863 00	Building and construction plastics foam products, n.s.k. ....	(NA)	-	(NA)	(NA)
30864 --	Furniture and furnishings plastics foam products .....	(NA)	1 727.7	(NA)	902.5
30864 10	Carpet underlay, carpet and rug cushions .....	(NA)	476.2	(NA)	902.5
30864 20	Formed and slab stock for pillows, seating, cushioning .....	(NA)	956.9	(NA)	902.5
30864 30	Mattress cores (uncovered only) .....	(NA)	141.1	(NA)	902.5
30864 90	Other .....	(NA)	153.5	(NA)	902.5
30864 00	Furniture and furnishings plastics foam products, n.s.k. ....	(NA)	-	(NA)	(NA)

See footnotes at end of table.



Table 2. Product and Product Classes—Value of Shipments by All Producers: 1987 and 1982  
—Con.

[Includes value of products of this industry produced by (1) establishments classified in this industry (primary) and (2) establishments classified in other industries (secondary). Transfers of products of this industry from one establishment of the same company (interplant transfers) are also included. For further explanation, see Value of Shipments in appendix. For meaning of abbreviations and symbols, see introductory text.]

1987 product code	Product	1987		1982	
		Number of companies with shipments of \$100,000 or more	Value of product shipments <sup>1</sup> (million dollars)	Number of companies with shipments of \$100,000 or more	Value of product shipments <sup>1</sup> (million dollars)
3086- --	PLASTICS FOAM PRODUCTS—Con.				
30865 --	Consumer and institutional plastics foam products -----	(NA)	1 297.6	(NA)	838.2
30865 10	Cups -----	(NA)	564.3	}	838.2
30865 20	Plates and bowls -----	(NA)	312.4		
30865 30	Cooler chests -----	(NA)	74.1		
30865 40	Trays -----	(NA)	77.2		
30865 90	Other -----	(NA)	269.6		
30865 00	Consumer and institutional plastics products, n.s.k. -----	(NA)	-	(NA)	(NA)
30866 --	Other plastics foam products -----	(NA)	388.0	(NA)	384.2
30866 10	Electrical and electronic -----	(NA)	59.1	(NA)	86.4
30866 90	Other -----	(NA)	328.9	(NA)	297.8
30866 00	Other plastics foam products, n.s.k. -----	(NA)	-	(NA)	(NA)
30860 --	Plastics foam products, n.s.k. -----	(NA)	495.6	(NA)	(NA)
30860 00	Plastics foam products, n.s.k., typically for establishments with more than 20 employees (see note) -----	(NA)	396.0	(NA)	-
30860 02	Plastics foam products, n.s.k., typically for establishments with less than 20 employees (see note) -----	(NA)	99.6	(NA)	(NA)
3087- --	CUSTOM COMPOUNDING OF PURCHASED PLASTICS RESINS				
	Total -----	(NA)	2 211.2	(NA)	(NA)
30870 --	Custom compounding of purchased resins and color concentrates:				
30870 12	Custom compounding of purchased resins -----	(NA)	1 536.4	(NA)	(NA)
30870 13	Color concentrates -----	(NA)	570.8	(NA)	(NA)
30870 00	Custom compounding of purchased resins and color concentrates, n.s.k., typically for establishments with 20 employees or more (see note) -----	(NA)	41.7	(NA)	(NA)
30870 02	Custom compounding of purchased plastics resins, n.s.k., typically for establishments with less than 20 employees (see note) -----	(NA)	62.4	(NA)	(NA)
3088- --	PLASTICS PLUMBING FIXTURES				
	Total -----	(NA)	675.1	(NA)	(NA)
30880 --	Plastics plumbing fixtures:				
30880 00	Plastics plumbing fixtures (for additional detail, see Current Industrial Report MQ-34E, Plumbing Fixtures) -----	(NA)	646.2	(NA)	(NA)
30880 02	Plastics plumbing fixtures, n.s.k., typically for establishments with less than 20 employees (see note) -----	(NA)	28.9	(NA)	(NA)
3089- --	PLASTICS PRODUCTS, N.E.C.				
	Total -----	(NA)	32 609.0	(NA)	(NA)
30891 --	Transportation fabricated plastics products, except foam and reinforced plastics -----	(NA)	4 272.7	(NA)	(NA)
	Components, housings, accessories, and parts for transportation equipment:				
30891 01	Motor vehicles -----	(NA)	3 932.9	(NA)	(NA)
30891 03	Aircraft, space, and missile -----	(NA)	164.1	(NA)	(NA)
30891 09	Other -----	(NA)	154.5	(NA)	(NA)
30891 00	Transportation fabricated plastics products, except foam and reinforced plastics, n.s.k. -----	(NA)	21.3	(NA)	(NA)
30892 --	Electrical and electronic fabricated plastics products, excluding foam and reinforced plastics -----	(NA)	2 420.1	(NA)	(NA)
30892 10	Office, computing and accounting machines, cash registers, and data processing machines -----	(NA)	570.2	(NA)	(NA)
30892 20	Household and commercial appliances -----	(NA)	692.5	(NA)	(NA)
30892 30	Communications equipment -----	(NA)	206.7	(NA)	(NA)
30892 90	Other electrical and electronic, including wiring devices and parts -----	(NA)	920.0	(NA)	(NA)
30892 00	Electrical and electronic fabricated plastics products, except foam and reinforced plastics, n.s.k. -----	(NA)	30.7	(NA)	(NA)
30893 --	Industrial machinery plastics products, except foam:				
30893 00	Industrial machinery plastics products, except foam (including gears, bearings, bushings, cams, other components, housings, process equipment, tooling plugs, grommets, material handling trays, etc.) -----	(NA)	752.4	(NA)	(NA)
30894 --	Plastics packaging, except film and sheet, foam, and bottles -----	(NA)	3 986.4	(NA)	(NA)
30894 01	Pails and drums, more than 3 gallons -----	(NA)	405.3	(NA)	(NA)
30894 02	Tubs (for food products) -----	(NA)	354.9	(NA)	(NA)
30894 03	Jars (for toilet goods, cosmetics, and food products) -----	(NA)	381.9	(NA)	(NA)
30894 04	Caps and closures (for additional detail, see Current Industrial Report MO-34H, Closures for Containers) -----	(NA)	979.6	(NA)	(NA)
30894 05	Blister and bubble formed packaging -----	(NA)	138.3	(NA)	(NA)
30894 06	Shipping boxes and cases -----	(NA)	231.9	(NA)	(NA)
30894 07	Food trays (baskets, shipping boxes, and cases) -----	(NA)	194.8	(NA)	(NA)
30894 09	Other plastics packaging -----	(NA)	1 234.6	(NA)	(NA)
30894 00	Plastics packaging, except film and sheet, foam, and bottles, n.s.k. -----	(NA)	65.0	(NA)	(NA)
30895 --	Plastics dinnerware, tableware, kitchenware, and oven/microwave ware, except foam and cups -----	(NA)	1 075.0	(NA)	(NA)
30895 01	Dinnerware and kitchenware (for serving food and drink) -----	(NA)	510.2	(NA)	(NA)
30895 02	Kitchenware (for preparing and storing food and drink) -----	(NA)	370.8	(NA)	(NA)
30895 03	Oven/microwave ware (for use in conventional and microwave ovens) -----	(NA)	185.0	(NA)	(NA)
30895 00	Plastics dinnerware, tableware, kitchenware, oven/microwave ware, except foam and cups, n.s.k. -----	(NA)	9.0	(NA)	(NA)

See footnotes at end of table.

**Table 2. Product and Product Classes—Value of Shipments by All Producers: 1987 and 1982**  
—Con.

[Includes value of products of this industry produced by (1) establishments classified in this industry (primary) and (2) establishments classified in other industries (secondary). Transfers of products of this industry from one establishment of the same company (interplant transfers) are also included. For further explanation, see Value of Shipments in appendix. For meaning of abbreviations and symbols, see introductory text.]

1987 product code	Product	1987		1982	
		Number of companies with shipments of \$100,000 or more	Value of product shipments <sup>1</sup> (million dollars)	Number of companies with shipments of \$100,000 or more	Value of product shipments <sup>1</sup> (million dollars)
<b>3089- --</b>	<b>PLASTICS PRODUCTS, N.E.C.—Con.</b>				
30896 --	Consumer, institutional, and commercial fabricated plastics products, except foam and wire coated, n.e.c. ....	(NA)	5 019.6	(NA)	(NA)
30896 11	Plastics cups, except foam (including vending machines, over-the-counter, carryout, etc.) .....	(NA)	323.4	(NA)	(NA)
30896 12	Sinkware, including flatware drainers, dish drainers, drainer trays and mats, sink mats, sink strainers, dustpans, soapdishes, etc. ....	(NA)	112.2	(NA)	(NA)
30896 13	Bathware, including shower and bath caddies, shower and bathtubs, tissue holders, toothbrush holders, toilet bowl brushes (all plastics) and brush holders, towel racks, etc. ....	(NA)	70.8	(NA)	(NA)
30896 14	Utility containers, including buckets, pails, laundry baskets, vegetable bins, dishpans, etc. ....	(NA)	243.6	(NA)	(NA)
30896 15	Organizers and holders for closets, drawers, and shelves (including paper towel holders, dust mop and broom holders, flatware trays, turntables, cup racks, spice racks, grocery bag holders, etc.) .....	(NA)	80.9	(NA)	(NA)
30896 16	Wastebaskets .....	(NA)	99.8	(NA)	(NA)
30896 17	Garbage and trash containers, excluding trash bags .....	(NA)	250.7	(NA)	(NA)
30896 18	Grower flowerpots and accessories .....	(NA)	91.0	(NA)	(NA)
30896 19	Decorative flowerpots, flower boxes, planters, and accessories .....	(NA)	94.1	(NA)	(NA)
30896 21	Picnic jugs, cooler chests, and ice buckets .....	(NA)	156.1	(NA)	(NA)
30896 22	Hardware, including clamps, handles, hinges, locks, casters, knobs, nails, etc. ....	(NA)	193.2	(NA)	(NA)
30896 23	Hospitalware, including pitchers, wash basins, trays, bedpans, etc. ....	(NA)	219.1	(NA)	(NA)
30896 24	Laboratory ware, including petri dishes, flasks, funnels, etc. ....	(NA)	205.9	(NA)	(NA)
30896 25	Individual packing boxes and cases for consumer products .....	(NA)	332.5	(NA)	(NA)
30896 26	Sponges and scrubbing pads .....	(NA)	63.7	(NA)	(NA)
30896 27	Other consumer, institutional, and commercial fabricated plastics products .....	(NA)	2 379.3	(NA)	(NA)
30896 00	Consumer, institutional, and commercial fabricated plastics products, except foam and wire coated, n.e.c., n.s.k. ....	(NA)	103.4	(NA)	(NA)
30897 --	Plastics furniture components and furnishings, excluding foam and reinforced plastics .....	(NA)	513.1	(NA)	(NA)
30897 01	Furniture components, accessories, and parts .....	(NA)	366.4	(NA)	(NA)
30897 09	Other, including fixtures, lamp shades, mirror and picture frames, etc. ....	(NA)	146.7	(NA)	(NA)
30897 00	Plastics furniture components and furnishings, excluding foam and reinforced plastics, n.s.k. ....	(NA)	-	(NA)	(NA)
30898 --	Building and construction fabricated plastics products, except foam, plumbing fixtures, and reinforced plastics .....	(NA)	2 200.3	(NA)	(NA)
30898 01	Corrugated and flat panels .....	(NA)	57.1	(NA)	(NA)
30898 02	Glazing panels .....	(NA)	( <sup>4</sup> )	(NA)	(NA)
30898 03	Doors, partitions, moldings, windows and frames, and decorative trim .....	(NA)	692.3	(NA)	(NA)
30898 04	Siding and accessories, including soffit, fascia, and skirts .....	(NA)	665.4	(NA)	(NA)
30898 05	Fittings and unions .....	(NA)	246.7	(NA)	(NA)
30898 06	Supported wall and counter coverings .....	(NA)	52.5	(NA)	(NA)
30898 07	Unsupported wall and counter coverings, including wall and ceiling tile .....	(NA)	48.7	(NA)	(NA)
30898 08	Swimming pool liners and covers .....	(NA)	55.9	(NA)	(NA)
30898 09	Other building and construction plastics products .....	(NA)	*361.1	(NA)	(NA)
30898 00	Building and construction fabricated plastics products, except foam, plumbing fixtures, and reinforced plastics, n.s.k. ....	(NA)	20.6	(NA)	(NA)
30899 --	Plastics shoe products, including taps, soles, slabs, and quarterlinings: .....				
30899 00	Plastics shoe products, including taps, soles, slabs, and quarterlinings .....	(NA)	67.6	(NA)	(NA)
3089A --	Reinforced and fiberglass plastics products, n.e.c.: .....				
3089A 11	Transportation .....	(NA)	2 548.1	(NA)	(NA)
3089A 12	Electrical and electronic .....	(NA)	965.2	(NA)	(NA)
3089A 14	Building and construction .....	(NA)	463.0	(NA)	(NA)
3089A 18	Other fabricated fiberglass and reinforced products, excluding furniture .....	(NA)	309.3	(NA)	(NA)
3089A 00	Reinforced and fiberglass plastics products, n.e.c., n.s.k. ....	(NA)	810.6	(NA)	(NA)
30890 --	Plastics products, n.e.c., n.s.k. ....	(NA)	-	(NA)	(NA)
30890 00	Plastics products, n.e.c., n.s.k., typically for establishments with 20 employees or more (see note) .....	(NA)	9 753.6	(NA)	(NA)
30890 02	Plastics products, n.e.c., n.s.k., typically for establishments with less than 20 employees (see note) .....	(NA)	8 510.2	(NA)	(NA)
		(NA)	1 243.4	(NA)	(NA)

Note: In 1987 Census of Manufactures, data for establishments of small single unit companies with up to 20 employees were estimated from administrative-record data rather than data actually collected from respondents. Employment cutoffs used for administrative records for each industry and shipments figures are included in code ending with "002". In both 1987 and 1982 Census of Manufactures, products not completely identified on standard forms were coded in appropriate product class (five-digit) followed by "00" or to appropriate product group code (four-digit) followed by "000".

<sup>1</sup>Data reported by all producers, not just those with shipments of \$100,000 or more.

<sup>2</sup>Industry 3082 is new for 1987. In 1982, the data for this industry was published as product code 3079K 80. Detailed data for 1982 are not available.

<sup>3</sup>Industry 3083 is new for 1987. In 1982, the data for this industry was published as product code 3079K 90. Detailed data for 1982 are not available.

<sup>4</sup>For 1987, product code 30898 02 and product code 30898 09 are combined to avoid disclosing data for individual companies.

Table 3. Materials Consumed by Kind: 1987 and 1982

[Includes quantity and cost of materials consumed or put into production by establishments classified only in this industry. For further explanation, see Cost of Materials in appendix. For meaning of abbreviations and symbols, see introductory text]

1987 material code	Material	1987		1982	
		Quantity <sup>1</sup>	Delivered cost (million dollars)	Quantity <sup>1</sup>	Delivered cost (million dollars)
	<b>INDUSTRY 3081, UNSUPPORTED PLASTICS FILM AND SHEET</b>				
	Materials, parts, containers, and supplies -----	(X)	3 662.8	(NA)	(NA)
249960 282104	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	28.4	(NA)	(NA)
	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	1 686.4	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	398.6	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	59.9	(NA)	(NA)
286935	Plasticizers ----- mil lb..	(S)	61.9	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- do..	(S)	73.6	(NA)	(NA)
220234	Cotton fabrics ----- mil lin yd..	(S)	.8	(NA)	(NA)
220239	Other textile fabrics ----- do..	(S)	8.2	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	101.6	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	109.8	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	22.1	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	(S)	31.6	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	261.5	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	27.5	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	18.1	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	509.3	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	263.6	(NA)	(NA)
	<b>INDUSTRY 3082, UNSUPPORTED PLASTICS PROFILE SHAPES</b>				
	Materials, parts, containers, and supplies -----	(X)	964.8	(NA)	(NA)
249960 282104	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	5.2	(NA)	(NA)
	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	495.2	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	68.0	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	58.5	(NA)	(NA)
286935	Plasticizers ----- mil lb..	(S)	10.4	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- do..	(S)	8.8	(NA)	(NA)
220234	Cotton fabrics ----- mil lin yd..	(S)	(D)	(NA)	(NA)
220239	Other textile fabrics ----- do..	(S)	1.8	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	7.0	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	21.9	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	(D)	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	(S)	3.0	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	8.0	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	3.3	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	5.6	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	139.0	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	105.4	(NA)	(NA)
	<b>INDUSTRY 3083, LAMINATED PLASTICS PLATE, SHEET, AND PROFILE SHAPES</b>				
	Materials, parts, containers, and supplies -----	(X)	937.1	(NA)	(NA)
249960 282104	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	2.5	(NA)	(NA)
	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	157.3	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	101.3	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	19.4	(NA)	(NA)
286935	Plasticizers ----- mil lb..	(S)	1.8	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- do..	(S)	90.5	(NA)	(NA)
220234	Cotton fabrics ----- mil lin yd..	(S)	5.9	(NA)	(NA)
220239	Other textile fabrics ----- do..	(S)	5.1	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	235.3	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	8.7	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	5.2	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	(S)	3.2	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	55.0	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	( <sup>3</sup> )	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	3.8	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	<sup>3</sup> 179.8	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	62.4	(NA)	(NA)

See footnotes at end of table.



**Table 3. Materials Consumed by Kind: 1987 and 1982—Con.**

[Includes quantity and cost of materials consumed or put into production by establishments classified only in this industry. For further explanation, see Cost of Materials in appendix. For meaning of abbreviations and symbols, see introductory text]

1987 material code	Material	1987		1982	
		Quantity <sup>1</sup>	Delivered cost (million dollars)	Quantity <sup>1</sup>	Delivered cost (million dollars)
	<b>INDUSTRY 3084, PLASTICS PIPE</b>				
	Materials, parts, containers, and supplies -----	(X)	1 383.2	(NA)	(NA)
249960	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	1.9	(NA)	(NA)
282104	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	940.8	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	10.9	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	(D)	(NA)	(NA)
286935	Plasticizers ----- mil lb..	(S)	16.0	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- do..	(S)	14.5	(NA)	(NA)
220239	Other textile fabrics ----- mil lin yd..	(S)	(D)	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	.9	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	18.0	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	5.0	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	(S)	4.3	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	4.7	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	(D)	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	3.0	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	127.6	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	68.9	(NA)	(NA)
	<b>INDUSTRY 3085, PLASTICS BOTTLES</b>				
	Materials, parts, containers, and supplies -----	(X)	1 292.8	(NA)	(NA)
249960	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	(D)	(NA)	(NA)
282104	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	628.8	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	84.4	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	17.1	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- mil lb..	(D)	(D)	(NA)	(NA)
220239	Other textile fabrics ----- mil lin yd..	(S)	(D)	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	5.7	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	148.3	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	(D)	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	(S)	9.2	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	(D)	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	3.3	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	7.6	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	257.0	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	120.3	(NA)	(NA)
	<b>INDUSTRY 3086, PLASTICS FOAM PRODUCTS</b>				
	Materials, parts, containers, and supplies -----	(X)	3 442.8	(NA)	(NA)
249960	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	5.6	(NA)	(NA)
282104	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	808.5	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	199.7	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	314.8	(NA)	(NA)
286935	Plasticizers ----- mil lb..	(S)	26.9	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- do..	(S)	26.0	(NA)	(NA)
220234	Cotton fabrics ----- mil lin yd..	(S)	(*)	(NA)	(NA)
220239	Other textile fabrics ----- do..	(S)	25.9	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	27.2	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	63.1	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	143.9	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	7.1	12.4	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	447.1	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	14.6	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	22.4	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	984.5	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	320.2	(NA)	(NA)
	<b>INDUSTRY 3087, CUSTOM COMPOUNDING OF PURCHASED PLASTICS RESINS</b>				
	Materials, parts, containers, and supplies -----	(X)	1 339.0	(NA)	(NA)
249960	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	.2	(NA)	(NA)
282104	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	630.5	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	3.1	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	26.5	(NA)	(NA)
286935	Plasticizers ----- mil lb..	(S)	77.9	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- do..	(S)	15.6	(NA)	(NA)

See footnotes at end of table.

Table 3. **Materials Consumed by Kind: 1987 and 1982—Con.**

[Includes quantity and cost of materials consumed or put into production by establishments classified only in this industry. For further explanation, see Cost of Materials in appendix. For meaning of abbreviations and symbols, see introductory text]

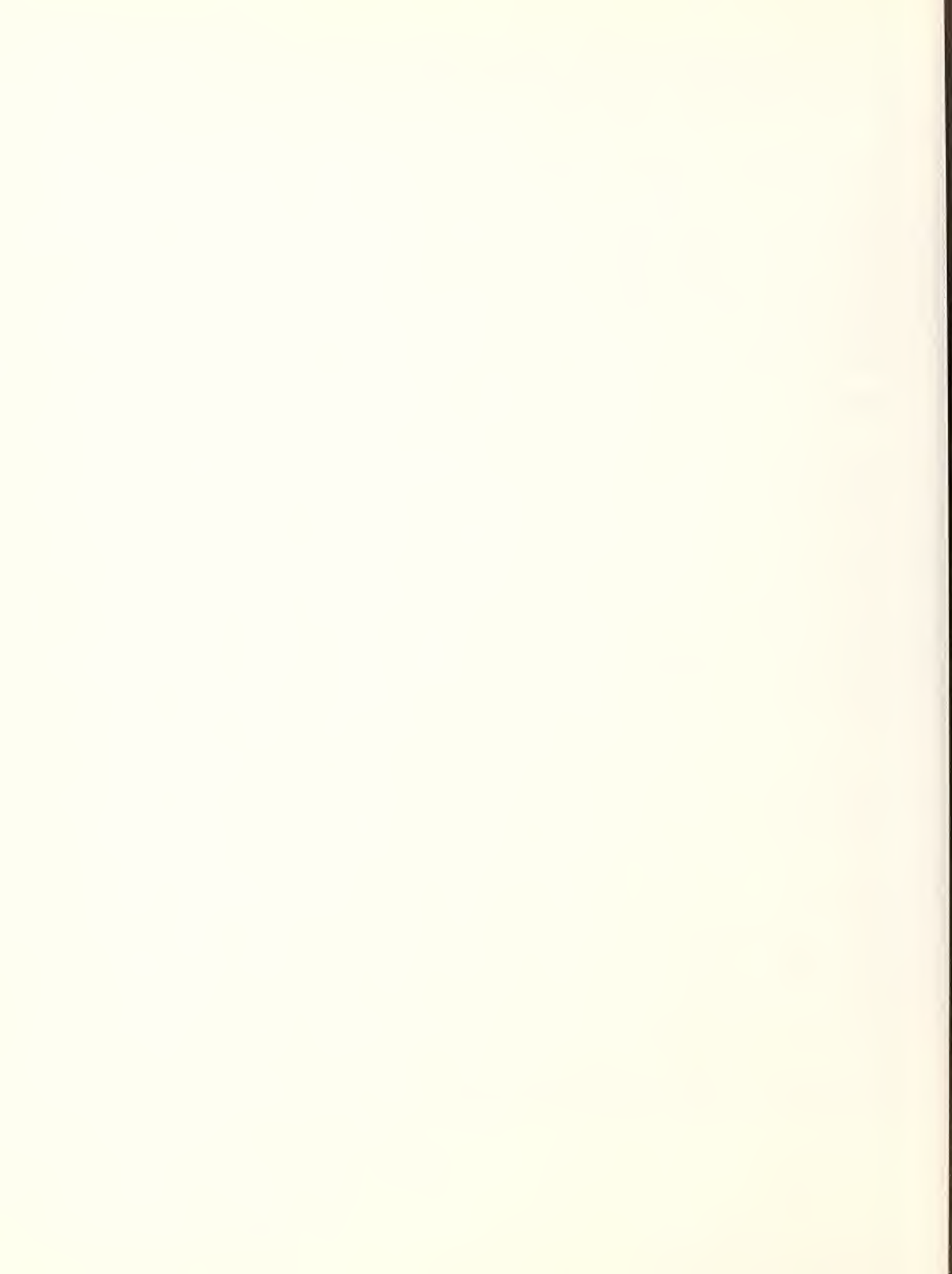
1987 material code	Material	1987		1982	
		Quantity <sup>1</sup>	Delivered cost (million dollars)	Quantity <sup>1</sup>	Delivered cost (million dollars)
	<b>INDUSTRY 3087, CUSTOM COMPOUNDING OF PURCHASED PLASTICS RESINS—Con.</b>				
220234	Cotton fabrics ----- mil lin yd..	(S)	(D)	(NA)	(NA)
220239	Other textile fabrics ----- do..	(S)	(D)	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	1.0	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	13.7	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	32.8	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	(S)	91.5	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	25.2	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	25.8	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	2.0	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	303.7	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	88.2	(NA)	(NA)
	<b>INDUSTRY 3088, PLASTICS PLUMBING FIXTURES</b>				
	<b>Materials, parts, containers, and supplies -----</b>	<b>(X)</b>	<b>256.4</b>	<b>(NA)</b>	<b>(NA)</b>
249960	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	(D)	(NA)	(NA)
282104	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	70.9	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	16.3	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	3.9	(NA)	(NA)
286935	Plasticizers ----- mil lb..	(S)	(D)	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- do..	(S)	14.5	(NA)	(NA)
220234	Cotton fabrics ----- mil lin yd..	(S)	(Z)	(NA)	(NA)
220239	Other textile fabrics ----- do..	-	(D)	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	(D)	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	5.6	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	.6	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	(S)	.5	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	(D)	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	(D)	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	.3	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	108.1	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	30.6	(NA)	(NA)
	<b>INDUSTRY 3089, PLASTICS PRODUCTS, N.E.C.</b>				
	<b>Materials, parts, containers, and supplies -----</b>	<b>(X)</b>	<b>13 688.2</b>	<b>(NA)</b>	<b>(NA)</b>
249960	Hardwood-wood fiberboard (1/8 inch basis) ----- mil sq ft..	(S)	60.3	(NA)	(NA)
282104	Plastics resins consumed in the form of granules, pellets, powders, liquids, etc., but excluding sheets, rods, tubes, and shapes ----- mil lb..	(S)	4 114.8	(NA)	(NA)
308007	Plastics products consumed in the form of sheets, rods, tubes, and other shapes -----	(X)	794.6	(NA)	(NA)
308700	Custom compounded resins (purchased) -----	(X)	221.8	(NA)	(NA)
286935	Plasticizers ----- mil lb..	(S)	52.8	(NA)	(NA)
322931	Glass fiber, roving, mats, etc. ----- do..	(S)	141.7	(NA)	(NA)
220234	Cotton fabrics ----- mil lin yd..	(S)	10.3	(NA)	(NA)
220239	Other textile fabrics ----- do..	(S)	84.2	(NA)	(NA)
260003	Paper and paperboard products, except paperboard boxes, containers, and corrugated paperboard -----	(X)	100.3	(NA)	(NA)
265001	Paperboard containers, boxes, and corrugated paperboard -----	(X)	328.2	(NA)	(NA)
281000	Industrial inorganic chemicals, except inorganic pigments -----	(X)	94.9	(NA)	(NA)
281600	Inorganic pigments ----- mil lb..	(S)	71.2	(NA)	(NA)
286001	Industrial organic and synthetic organic chemicals, except synthetic dyes, pigments, lakes, and toners -----	(X)	59.3	(NA)	(NA)
286503	Synthetic dyes, pigments, lakes, and toners -----	(X)	44.4	(NA)	(NA)
355931	Parts and attachments specially designed for plastics working machinery -----	(X)	121.1	(NA)	(NA)
970099	All other materials and components, parts, containers, and supplies consumed (see note) -----	(X)	3 039.9	(NA)	(NA)
971000	Materials, parts, containers, and supplies, n.s.k. <sup>2</sup> -----	(X)	4 348.4	(NA)	(NA)

<sup>1</sup>For some establishments, data have been estimated from central unit values which are based on quantity-cost relationships of reported data. The following symbols are used when percentage of each quantity figure estimated in this manner equals or exceeds 10 percent of published figure: \* 10 to 19 percent estimated, \*\* 20 to 29 percent estimated. IF 30 percent or more is estimated, figure is replaced by (S).

<sup>2</sup>Total cost of materials of establishments that did not report detailed materials data, including establishments that were not mailed a form.

<sup>3</sup>For 1987, material code 386503 and material code 970099 are combined to avoid disclosing data for individual companies.

<sup>4</sup>For 1987, material code 220234 and material code 970099 are combined to avoid disclosing data for individual companies.





# APPENDIX

## Scope and Coverage and Explanation of Terms

### GENERAL

The 1987 Census of Manufactures is the 32nd census of manufacturing establishments conducted in the United States. For 1987, it was conducted as part of the economic censuses, which included the censuses of mineral industries, construction industries, retail and wholesale trades, service industries, selected transportation activities, and minority-owned and women-owned businesses, under authority of title 13 of the United States Code. Title 13 specifies that an economic census be conducted every 5 years to cover years ending in 2 and 7.

### SCOPE AND COVERAGE

#### Establishment Basis of Reporting

The census of manufactures is conducted on an establishment basis. All manufacturing establishments with one paid employee or more at any time during the year are covered by the census of manufactures. Therefore, a company operating at more than one location is required to file a separate report for each location. This report excludes information for separately operated administrative offices, warehouses, garages, and other auxiliary units which service manufacturing establishments of the same company. Where these auxiliary operations are conducted at the same location as the manufacturing operation, they are usually included in the report for the operating manufacturing establishment.

#### Use of Administrative Records

From a universe of approximately 350,000 manufacturing establishments in the 1987 Census of Manufactures, approximately 150,000 small single-establishment companies were excused from filing reports. Selection of the small establishment nonmail cases was done on an industry-by-industry basis. A variable cutoff was used to determine those establishments for which administrative records were to be used in place of a census report. The cutoffs were selected so the administrative-record cases would account for approximately 3 percent or less of the value of shipments for the industry. These cutoffs were then adjusted so that all single-establishment companies with less than 5 employees were excluded from the mail canvass, while all establishments with more than 20 employees were included. Where establishments in the 5 to 20 employee size range were included in the mail canvass, an abbreviated census form was frequently used.

For these nonmail establishments, (and a small number of larger establishment whose reports were not received at the time the data were tabulated) data on employment, payroll, and receipts were obtained from administrative records of other government agencies rather than from census forms. The administrative-record information was then used in conjunction with industry averages to estimate the data for these establishments. The value of shipments and cost of materials were not distributed among specific products and materials but were included in the product and material "not specified by kind" (n.s.k.) categories.

### EXPLANATION OF TERMS

**Number of establishments and companies**—A separate report was required for each manufacturing establishment (plant) with one employee or more. An establishment is defined as a single physical location where manufacturing is performed. A company, on the other hand, is defined as a business organization consisting of one establishment or more under common ownership or control.

**All employees**—Includes all full-time and part-time employees on the payrolls at any time during the year. Included are all persons on paid sick leave, paid holidays, and paid vacations. Officers of corporations are included as employees; proprietors and partners of unincorporated firms are excluded. The "all employees" number is the average number of production workers plus the number of other employees in mid-March. The number of production workers is the average of those for midmonth payroll periods of March, May, August, and November.

**Production workers**—Includes workers up through the working-supervisor level engaged in fabricating, processing, assembling, inspecting, receiving, packing, warehousing, shipping (but not delivering), maintenance, repair, janitorial, guard services, product development, auxiliary production for plant's own use (e.g., power-plant), recordkeeping, and other closely associated services. Truckdrivers delivering ready-mixed concrete are also included in production workers.

**Other employees**—Includes nonproduction personnel, including those engaged in the following activities: supervision above working-supervisor level, sales (including driver/salespersons), sales delivery (truckdrivers and helpers), advertising, credit collection, installation and

servicing of own product, clerical and routine office functions, executive, purchasing, finance, legal, personnel (including cafeteria, etc.), professional, and technical employees.

**Payroll**—Includes the gross earnings for the “employees” defined above, such as salaries, wages, commissions, dismissal pay, bonuses, vacation and sick leave pay, and compensation in kind, prior to such deductions as employees’ Social Security contributions, withholding taxes, group insurance, union dues, and savings bonds. Respondents were told that in reporting they could follow the definition of payrolls used for calculating the Federal withholding tax.

**Production-worker hours**—Covers hours worked or paid for at the plant, including actual overtime hours (not straight-time equivalent hours). It excludes hours paid for vacations, holidays, or sick leave when the employee was not at the plant.

**Cost of materials**—Refers to direct charges actually paid or payable for items consumed or put into production during the year, including freight charges and other direct charges incurred by the establishment in acquiring these materials. It includes the cost of materials or fuels consumed, regardless of whether they were purchased by the individual establishment from other companies, transferred to it from other establishments of the same company, or withdrawn from inventory during the year.

The important components of this cost item are (a) all raw materials, semifinished goods, parts, containers, scrap, and supplies put into production or used as operating supplies and for repair and maintenance during the year; (b) electric energy purchased; (c) fuels consumed for heat, power, or generating electricity; (d) work done by others on materials or parts furnished by manufacturing establishments (contract work); and (e) products bought and resold in the same condition.

**Specific materials consumed (table 3)**—In addition to the total cost of materials which every establishment was required to report, information was also collected for most manufacturing industries on the consumption of major materials used in manufacturing. These inquiries were restricted to those materials which were important parts of the cost of production in a particular industry and for which cost information was available from manufacturers’ records. Establishments consuming less than a specified amount (usually \$10,000) of a specific material were not requested to report consumption of that material separately. Also, the cost of materials for the small establishments for which administrative records were used was estimated as “not specified by kind” (n.s.k.).

**Value of shipments and other receipts**—Generally refers to received or receivable net selling values, f.o.b. plant (exclusive of freight and taxes), of all products shipped, both primary and secondary, as well as all

miscellaneous receipts such as receipts for contract work performed for others, installation and repair receipts, sale of scrap, and sale of products bought and resold without further processing. Included are all items made by or for the establishment from materials owned by it whether sold, transferred to other plants of the same company, or shipped on consignment. The net selling value of products made in one plant on a contract basis from materials owned by another was reported by the plant providing the materials.

In a few industries, the value of production or value of work completed is used instead of value of shipments. These industries are identified in the introduction and are footnoted in table 1.

In the case of multiunit companies, the manufacturer was requested to report the value of products transferred to other establishments of the same company at full economic or commercial value, that is, including not only the direct costs of production but also a reasonable proportion of “all other costs” (including company overhead and profit).

**Shipments or production of individual products (table 2)**—In the 1987 census, detailed shipment information was collected for approximately 11,000 individual products. These products are identified by a seven-digit code and are grouped into approximately 1,500 classes of products, which in turn are primary to 459 four-digit industries. Data at the five-digit product-class level have been collected each year as part of the annual survey of manufactures. Information at the seven-digit level, collected for many industries in the current industrial reports program, is not included in this table.

**Value added by manufacture**—This measure of manufacturing activity is derived by subtracting the cost of materials, supplies, containers, fuel, purchased electricity, and contract work from the value of shipments for products manufactured plus receipts for services rendered. The result of this calculation is then adjusted by the addition of value added by merchandising operations (that is, the difference between the sales value and cost of merchandise sold without further manufacturing, processing, or assembly) plus the net change in finished goods and work-in-process inventories between the beginning and end of the year.

For those industries where value of production is collected instead of value of shipments (see footnote in table 1), value added is adjusted only for the change in work-in-process inventories between the beginning and end of the year. For those industries where value of work done is collected, the value added does not include an adjustment for the change in finished goods or work-in-process inventories.

Value added avoids the duplication in the figure for value of shipments which results from the use of products of some establishments as materials by others. Value



added is considered to be the best value measure available for comparing the relative economic importance of manufacturing among industries and geographic areas.

**Expenditures for new plant and equipment**—Establishments in operation and any known plants under construction were asked to report their expenditures for (a) permanent additions and major alterations to manufacturing establishments and (b) new machinery and equipment used for replacement and additions to plant capacity if they are of the type for which depreciation accounts are ordinarily maintained.

These totals exclude expenditures for used plant and equipment, expenditures for land, and cost of maintenance and repairs charged as current operating expenses. Data for used plant and equipment will be published in the final industry bulletin.

**End-of-year inventories**—Comprised of (a) finished products; (b) work-in-process; and (c) materials, supplies, fuels, etc. Beginning in 1982, respondents were asked to report their inventories at (the lower of) cost or market prior to adjustment to LIFO cost. This is a change from prior years in which respondents were permitted to value their inventories using any generally accepted accounting method.

Therefore, 1982 through 1987 data for inventories are not strictly comparable to prior-year data.

**Specialization and coverage ratios**—An establishment is classified in a particular industry if its shipments of primary products of the industry exceed in value its shipments of the products of any other single industry. An establishments' shipments include those products assigned to an industry (primary products), those considered primary to other industries (secondary products), and receipts for miscellaneous activities (merchandising, contract work, resales, etc.). The following ratios have been developed to measure the relationship of primary product shipments to the data on shipments for the industry shown in table 1 and data on product shipments shown in table 2.

**Specialization ratio**—Represents the ratio of primary product shipments to total product shipments (primary and secondary, excluding miscellaneous receipts) for the establishments classified in the industry.

**Coverage ratio**—Represents the ratio of primary products shipped by the establishments classified in the industry to the total shipments of such products that are shipped by all manufacturing establishments, wherever classified.



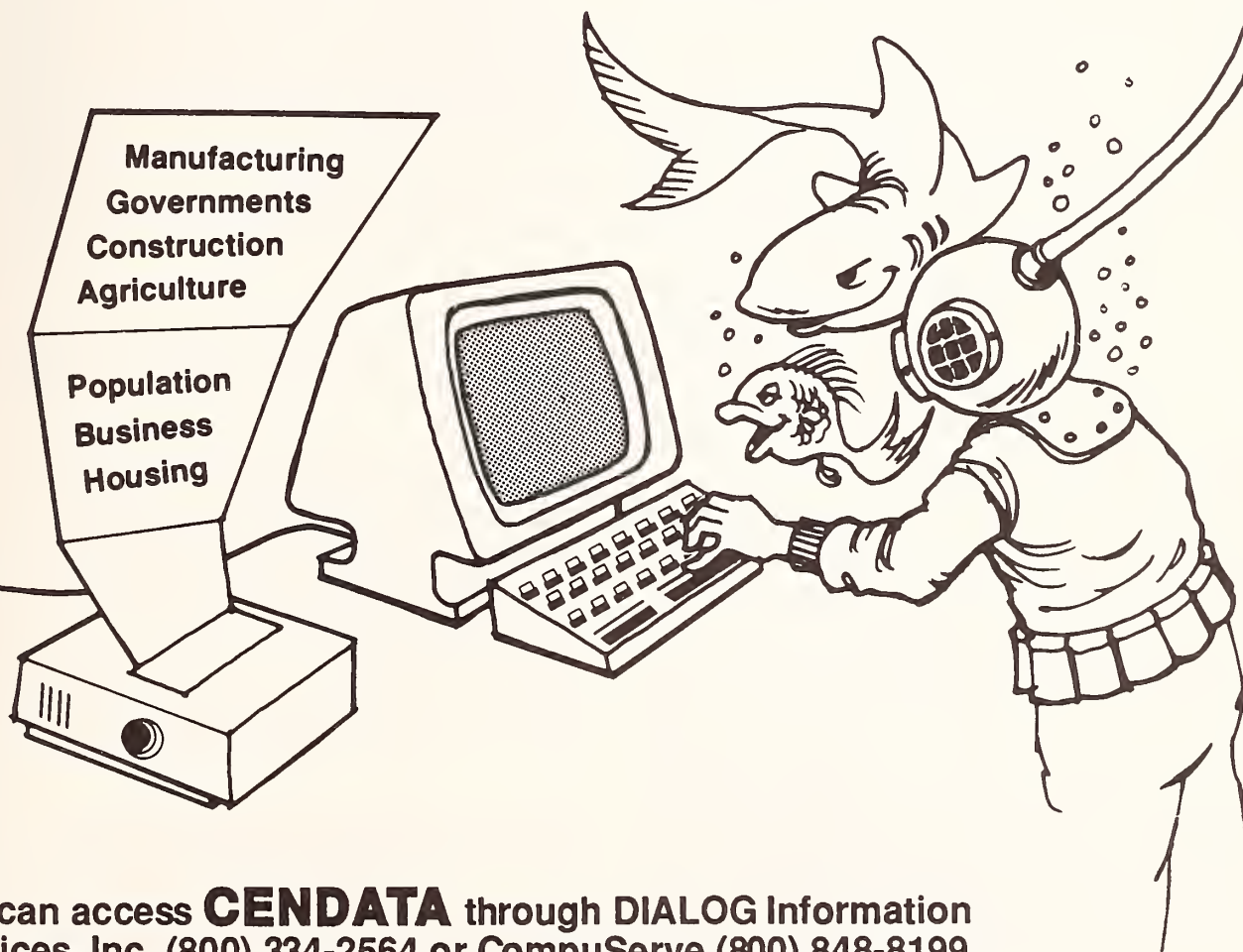


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